



# UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE  
United States Patent and Trademark Office  
Address: COMMISSIONER FOR PATENTS  
P.O. Box 1450  
Alexandria, Virginia 22313-1450  
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/852,836	05/10/2001	Mimi Chu Dong	10010237-1	5450

7590 06/01/2005

HEWLETT-PACKARD COMPANY  
Intellectual Property Administration  
P.O. Box 272400  
Fort Collins, CO 80527-2400

EXAMINER
----------

LETT, THOMAS J

ART UNIT	PAPER NUMBER
----------	--------------

2626

DATE MAILED: 06/01/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

## Office Action Summary

Application No.

09/852,836

Applicant(s)

DONG ET AL.

Examiner

Thomas J. Lett

Art Unit

2626

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

### Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

### Status

- 1) ☒ Responsive to communication(s) filed on 04 February 2005.
- 2a) ☒ This action is FINAL. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

### Disposition of Claims

- 4) ☒ Claim(s) 1-22 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☐ Claim(s) \_\_\_\_\_ is/are allowed.
- 6) ☒ Claim(s) 1-22 is/are rejected.
- 7) ☐ Claim(s) \_\_\_\_\_ is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

### Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 10 May 2001 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.  
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).  
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

### Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

\* See the attached detailed Office action for a list of the certified copies not received.

### Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)  
Paper No(s)/Mail Date \_\_\_\_\_.
- 4) ☐ Interview Summary (PTO-413)  
Paper No(s)/Mail Date \_\_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☒ Other: Detailed Action

## DETAILED ACTION

### *Response to Arguments*

1. Applicant's arguments filed 04 February 2005 have been fully considered but they are not persuasive. Applicant amends the independent claims, in general, by adding that the universal language is executable without the use of a virtual machine instruction processor.

In response to applicant's argument that no such processor is required or present, a recitation of the intended use of the claimed invention must result in a structural difference between the claimed invention and the prior art in order to patentably distinguish the claimed invention from the prior art. If the prior art structure is capable of performing the intended use, then it meets the claim. In a claim drawn to a process of making, the intended use must result in a manipulative difference as compared to the prior art. See *In re Casey*, 370 F.2d 576, 152 USPQ 235 (CCPA 1967) and *In re Otto*, 312 F.2d 937, 939, 136 USPQ 458, 459 (CCPA 1963).

The virtual machine instruction processors contained in the networked devices of the prior art of Yan et al are necessary to perform the functions, and is capable of performing the intended use.

### ***Claim Rejections - 35 USC § 102***

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

Art Unit: 2626

(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

3. Claims 1-22 are rejected under 35 U.S.C. 102(b) as being anticipated by Yan et al (US Patent 6,003,065).

With respect to claim 1, Yan et al disclose a method, using JAVA language, of robust communication capability including establishes a bidirectional communication between the selected peripheral device and the host computer for transmitting and receiving real-time information generated while the peripheral device is operating (col. 19, line 67 - col. 20, line 3), which reads on transceiving a device identification to the electrical device in a universal image capture language; and

a system coupled to transfer image data to one or more peripheral devices such as a printer 102B, an image capture device such as a camera 102C, a telecommunication device such as a telephone 102D, an image display device such as an HDTV television 102E, an image input device such as a scanner 102F (col. 6, lines 52-63), which reads on transmitting image data to the electrical device.

With respect to claim 2, Yan et al disclose an example of a peripheral downloading a response application back to the requesting host machine requesting the user or application to select a different set of criteria for printing the job (col. 19, lines 18-21), which reads on receiving an acknowledgement communication from the electrical device in the universal image capture language.

With respect to claim 3, Yan et al disclose that if for some reason the peripheral device has not completed execution, these instructions can be delegated for execution

on another host machine or other peripheral device (col. 19, lines 61-64), which reads on the device identification comprises at least one escape sequence.

With respect to claim 4, Yan et al disclose that the system queries a peripheral database containing information about system peripherals (col. 21, lines 65-67).

Examiner also notes that it is inherent that such a system would receive a hardware/device ID, which is a vendor-defined identification string that a setup process would use to match a device to an information file, which reads on the device identification is transmitted from an image capture device.

With respect to claim 5, Yan et al disclose an example of a camera comprising a virtual machine instruction processor 108 (FIG. 1), which reads on the electrical device comprises a computing device.

With respect to claim 6, Yan et al disclose a camera 102C (FIG. 1, which reads on the electrical device comprises a peripheral device.

With respect to claim 7, Yan et al disclose that the system queries a peripheral database containing information about system peripherals (col. 21, lines 65-67).

Examiner also notes that it is inherent that such a system would receive a hardware/device ID, which is a vendor-defined identification string that a setup process would use to match a device to an information file, which reads on receiving a device identification from the image capture device communicated in a universal image capture language;

Examiner notes that it is inherent for the host computer 102A to interpret a vendor-defined hardware/device ID, which reads on interpreting the device identification; and

send the results back to a host processor for review by a user rather than actually printing the image (col. 15, lines 22-23), which reads on receiving the image data from the image capture device.

With respect to claim 8, Yan et al disclose an example of a host machine or user responding to a printer by selecting the high-resolution black and white printer to print the job instead. (col. 19, lines 18-21), which reads on of transmitting an acknowledgement communication to the image capture device in the universal image capture language.

With respect to claim 9, Yan et al disclose that if for some reason the peripheral device has not completed execution, these instructions can be delegated for execution on another host machine or other peripheral device (col. 19, lines 61-64), which reads on the device identification comprises at least one escape sequence.

With respect to claim 10, Yan et al disclose drivers used to convert data formats and drive hardware signals on a peripheral device are replaced with general purpose virtual machine instruction applications written in languages such as JAVA. Typically, these general purpose virtual machine instruction applications are self-contained and therefore can be executed on almost any peripheral device or host device on the network for processing (col. 22, lines 20-26), which reads on the device identification is received by a universal image capture driver.

Art Unit: 2626

With respect to claim 11, Yan et al disclose the virtual machine instruction applications are contained in processor 106X (Fig. 1), which reads on the universal image capture driver comprises part of a computing device.

With respect to claim 12, Yan et al disclose the virtual machine instruction applications are contained in peripheral devices 102X (Fig. 1), which reads on the universal image capture driver comprises part of a peripheral device.

With respect to claim 13, Yan et al disclose an image capture device (camera 102C) comprising:

a processing device adapted to control operation of the image capture device (operating system 230 of camera 102C is capable of managing resources and processing requests associated with a particular peripheral device or host computer, col. 10, lines 10-15);

an image capture module (primary storage 216 and secondary storage 218 of camera 102C can include any type of computer storage (see Fig. 2) and Examiner notes that it is inherent that a digital camera contain a module for capturing images);

a communication module (processing unit 106C) that communicates in a universal image capture language (host computer 102A and the one or more peripheral devices 102B-102G are capable of unicast (i.e. point-to-point) or multicast communications over the network using a common network communication mechanism such as the TCP/IP protocol running under an operating system such as JAVA/OS, col. 6, line 63 – col. 7, line 1) that is executable without a virtual machine instruction processor;

image capture hardware adapted to retrieve and store image data (primary storage 216, secondary storage 218, primary network interface 212 and secondary network interface 211 (see Fig. 2)); and

a device interface adapted to facilitate communication with other devices (primary network interface 212 and secondary network interface 211 (see Fig. 2));

wherein the image capture device does not comprise a virtual machine instruction processor.

With respect to claim 14, Yan et al disclose the user can even request a peripheral device such as a digital camera (col 12, lines 19-20), which reads on the device comprises a digital camera.

With respect to claim 15, Yan et al disclose an image input device such as a scanner 102F may be used, (col 6, lines 59-60), which reads on the device comprises a scanner.

With respect to claim 16, Yan et al disclose an electrical device (camera 102C), comprising;

a processing device (operating system 230) adapted to control operation of the image capture device (operating system 230 of camera 102C is capable of managing resources and processing requests associated with a particular peripheral device or host computer, col. 10, lines 10-15);

a communication module (processing unit 106C) that communicates in a universal image capture language (host computer 102A and the one or more peripheral devices 102B-102G are capable of unicast (i.e. point-to-point) or multicast

Art Unit: 2626

communications over the network using a common network communication mechanism such as the TCP/IP protocol running under an operating system such as JAVA/OS, col. 6, line 63 – col. 7, line 1) that is executable without a virtual machine instruction processor;

primary storage 216 containing APIs and executables to control peripherals (Fig. 2), which reads on a control module; and

a device interface adapted to facilitate communication with other devices (primary network interface 212 and secondary network interface 211 (see Fig. 2));

wherein the image capture device does not comprise a virtual machine instruction processor.

With respect to claim 17, Yan et al disclose the user can even request a peripheral device such as a digital camera (col 12, lines 19-20), which reads on a universal image capture driver that is adapted to communicate with a variety of different image capture devices.

With respect to claim 18, Yan et al disclose that drivers used to convert data formats and drive hardware signals on a peripheral device are replaced with general purpose virtual machine instruction applications written in languages such as JAVA. Typically, these general purpose virtual machine instruction applications are self-contained and therefore can be executed on almost any peripheral device or host device on the network for processing (col. 22, lines 20-26), which reads on the universal image capture driver is adapted to communicate with a digital camera and a scanner.

With respect to claim 19, Yan et al disclose primary storage 216 containing APIs and executable computer program to control peripherals (Fig. 2), which reads on the memory includes a control module comprising at least one software application with which image data can be manipulated.

With respect to claim 20, Yan et al disclose a virtual machine instruction processor 108 contained in camera 102C (see FIG. 1), which reads on the device comprises a computing device.

With respect to claim 21, Yan et al disclose primary storage 216 containing APIs and executable computer program to control peripherals (Fig. 2), which reads on device operation hardware adapted to perform a particular physical operation and wherein the memory comprises an operation module that is adapted to control operation of the operation hardware.

With respect to claim 22, Yan et al disclose the virtual machine instruction applications are contained in peripheral devices 102x (Fig. 1), which reads on the device comprises a peripheral device.

### ***Conclusion***

**THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not

Art Unit: 2626

mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Thomas J. Lett whose telephone number is 571-272-7464. The examiner can normally be reached on 7-3:30pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Kimberly A. Williams can be reached on 571-272-7471. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

TJL



*KA Williams*  
KIMBERLY WILLIAMS  
SUPERVISORY PATENT EXAMINER